



# CLEVELAND CITY SCHOOLS CAREER & TECHNICAL EDUCATION

November/December 2021

## NEWSLETTER



Raider Evolve Board of Directors, Teachers, CCS CTE Supervisor, CCS Director of Schools, and CCS Director of Academics

## Raider Evolve

The Cleveland High School Raider Evolve Program Board of Directors met this month to hear the latest updates pertaining to the ever-evolving and innovative initiative. Raider Evolve, funded by a Tennessee Department of Education Perkins Reserve grant, is a career and technical program for Juniors and Seniors. The program is a multi-operational school corporation operated by students as a “hands-on” laboratory that integrates different aspects of a real-world environment.

Raider Evolve is geared toward entrepreneurial students interested in owning their own business or looking to deepen their knowledge of how a business, manufacturer, or corporation operates. Students answer to the board of directors incorporating local business professionals in our Cleveland community.

Our Raider Evolve students are learning through project based learning the skills associated with accounting, business management, marketing, communications and distribution as well as the basics of welding, fabrication, plasma cutting, laser etching, and creative design.

Dr. Russell Dyer, Director of Schools, notes this program is possible due to the support of the Cleveland City Schools Board of Education as well as the administration of Cleveland High School and CTE Supervisor, Mr. Renny Whittenbarger. Dr. Dyer states, “The work of our students involved in Raider Evolve brings the classroom to life and allows them to experience life in a real-world applicable way that will open the doors to a bright and successful future.”

Course facilitator, Dr. Megan Saez, states “Cleveland City Schools CTE is all about hands-on experiences for students and Raider Evolve will take that to the next level. The program will prepare students in many facets of business and industry and we will be able to send them out into the workforce, ready with the business and soft skills that are very much desired within industry. It will be an exciting opportunity for those who are in Raider Evolve to gain these skills as they look ahead to their long-term career goals.”

To learn more about CTE, follow us on Twitter [@ccscte](#), or visit our website [www.clevelandschools.org](http://www.clevelandschools.org).



## Arnold Elementary School

The third graders practiced making predictions about candy canes dissolving in vinegar, warm water, and cold water.



## Blythe-Bower Elementary

Students use Snaptricity Kits to learn about open and closed circuits.



## Candy's Creek Cherokee Elementary School

Second grade students are learning how snowflakes form and using the design process to create a model of a snowflake.



## E.L. Ross Elementary

The third graders were excited to use paper engineering to design an aqueduct. They learned about them in their unit studying Rome.



## George R. Stuart Elementary

Stuart Elementary celebrated National STEM Day with a school wide event. Every grade level completed a different STEM challenge ranging from testing boats for speed and capacity to building parachutes with the most air resistance. Here, third graders worked in teams to create a model of the respiratory system.



## Mayfield Elementary

Third grade students at Mayfield created catapults during their study of ancient Roman civilization.



## Yates Primary

First grade students at Yates Primary used their engineering skills to create a form of transportation for Little Red Riding Hood.





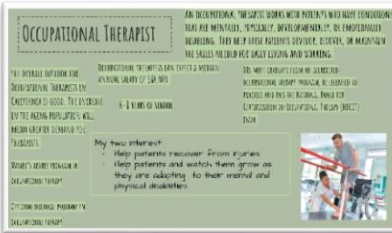
## Career Presentations

6th grade Business Communications students are sharing their career presentations in small groups. They have done a great job studying various business & tech jobs. Now it's time to show off the knowledge they have gained and analyze their own interest in each career!



## RaiderTV Hosts a Special Guest

RaiderTV loved having Mr. Steve Hartline from Mix 104.1 as a special guest! The 8th grade students were able to see his communication skills and professionalism in action.



## Career Exploration

CMS 8th grade medical science students have been exploring different medical careers.



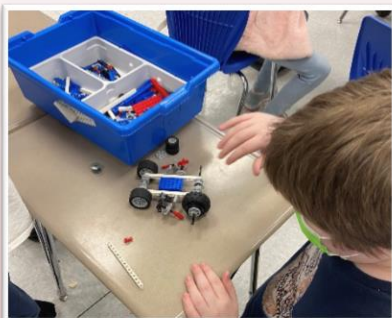
## Learning All About Nutritional Diets

CMS Medical Science students presenting over the pros and cons of different nutritional diets and how they effect the body!



## Flight Simulator

CMS Engineering students learn the basics of flight using the flight simulator located in the classroom.



## Lego Engineering

We design and create lego STEM toys because we believe that curiosity, fun and creativity are major drivers in getting students excited about science.



## Do Good December

AFJROTC FX cadets and Leadership 3 students prepared breakfast for CHS' cafeteria and janitorial staff.



## BRC Experience

CHS AFJROTC held our 1st Annual BRC Experience for CMS 8th graders interested in taking AFJROTC at CHS. They experienced all facets of our extracurricular teams. It was an enthusiastic group and we hope to see them next fall!



## Curriculum-In-Action

On Friday, November 19, 45 cadets took our fall Curriculum-In-Action trip to the Space and Rocket Center in Huntsville. This field trip cemented what we have taught during class this year on space.



## Post-Secondary Opportunities

CHS Automotive Students and CHS Welding students explore post-secondary opportunities with Mr. Crowder from Tulsa Welding School.



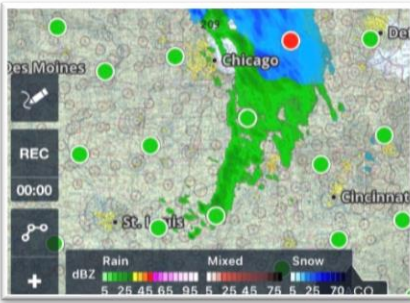
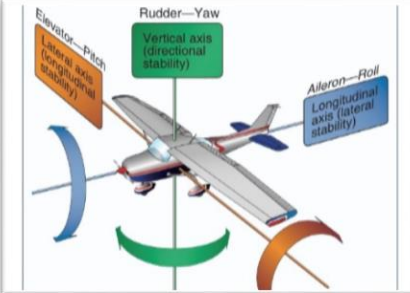
## Electrical System Check

Oil leaks, brakes and struts were all jobs that students learned about this month. Students were able to use our new training center in the shop.



## Students Tour Miller Industries

CHS Automotive students explore post-secondary opportunities by touring Miller Industries.



## Aviation Employment Opportunities

Employment of pilots is projected to grow 13% thru 2030, faster growth than all other occupations. 14,500 openings for airline & commercial pilots are projected each year. Check out CHS Aviation to learn more about how to become a pilot.

## Students Learn Flight Controls

Students are learning basics in aviation by understanding how flight controls work together to enable stable coordinated flight.

## Weather Observations

It is important to understand the weather and resources to use for aviation. Students learning about types of weather observations.



## Student Interviews

Business Academy students went through the formal interview process. They created cover letters, resumes, and conducted full interviews. They learned valuable business practices critical to their success.



## Business Students Assists The Runnin Raiders

CHS Intro to Business and Marketing students were proud to assist in welcoming former Runnin Raider standout, Ish Sanders, back for the declaration of "Ish Sanders Day."



## Students Learn About Personalities From Guest Speaker

Students learned what type of personality they were by coloring outside the lines with Meesh Kidd. Do you know what enneagram personality you are?



# COSMETOLOGY



## Students Learn Hair Cutting Skills

Cosmetology 1 students use “hands-on” learning by performing their first haircut!



## Skincare

Cosmetology students perform facials that promote skin firming, toning, exfoliation and relaxation.



## Foil Highlights

Cosmetology students learn how to foil highlight.

# CRIMINAL JUSTICE



## Community Policing Project

Students handed out over 2,000 Christmas treats to students and staff of CHS. Each had a personal message based on safety or lifting each other up.



## Supreme Court Arguments

Students conduct supreme court arguments over various topics, including dress code.



## Landmark Supreme Court Cases

Students complete a project researching and showcasing landmark supreme court cases.

## CULINARY ARTS



### Gingerbread House Competition

Culinary Arts students create their gingerbread houses for the Raider Cafe Gingerbread Competition.



### Raider Café Makes Cupcakes for Stuart Elementary

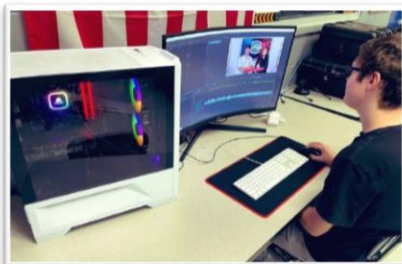
Raider Cafe students fixed pumpkin spiced cupcakes for Stuart Elementary school to enjoy during their pumpkin painting activity.



### Chef Rush Helps Students Make Pumpkin Rolls

Raider Cafe Culinary I students set up pumpkin roll cakes and prep rolls for catered function.

## DIGITAL MEDIA



### Students Learn to Adobe Premier Pro

Students Edit videos for CHSLive using Adobe Premier Pro.



### Students Celebrate a Job Well Done

CHSLive students celebrated a job well done by having a class party.



### Studio Remodel

CHSLive Studio, Control Room, and new Welcome Center are undergoing a complete remodel. The Digital Media students are working hard on getting everything ready!



@BLUERAIDERSLIVE



@CHSLIVE

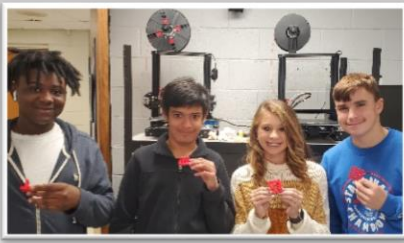


CHSLIVE



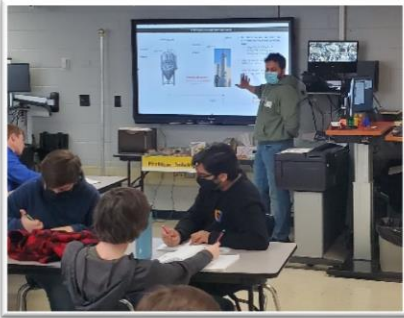
CHSLIVE

# ENGINEERING



## Design Thinking

Our Introduction to Engineering Design students were challenged to create 3D print designs that were able to be assembled! You wouldn't believe how difficult it can be to create the right fit!



## Wacker Design Challenge

Our Principles of Engineering class has partnered with Wacker Corporation to complete a complex design challenge! Although this realistic challenge is rigorous, they're putting their heads together to create an effective solution!



## Building a Wall

Our Architecture class is completing their semester by challenging themselves to build a wall section with plywood, electrical, plumbing, and even drywall. We may have a few future residential contractors here!

# HEALTH SCIENCE



## Spa Day in Sports Medicine

Sports Medicine treats our teachers to some chair massages, along with paraffin and heat therapy treatments this week for our medical business management unit.



## Students Create Clay Models of the Heart

Students had a competition to create the best heart model out of clay. Congratulation to Caroline and Mia, the winners of the competition!



## Students Learn Spinal Injections

Medical Therapeutics learn how to swaddle a newborn and do a spinal injection during our labor and delivery unit.





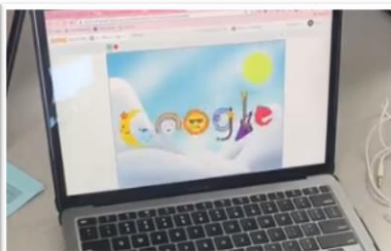
## Programming With Rubber Ducks

In Dr. Saez's computer science class, you will see students programming with rubber ducks by their laptops. This is a long time industry practice in programming to "talk it out with the duck." If you see them, ask them for the story!



## Coded Bias

Students watched the documentary "Coded Bias" on Netflix. It is an important issue in technology today and creates a huge awareness.



## Creating Google Logos

Students in Dr. Saez's Computer Science Foundations class created their own Google logo using Scratch programming. There were some creative logos with even better programming!



## Six Sigma 5S Process

Dr. Saez's Robotics 1 classes followed the Six Sigma 5S process to organize and clean the robotics cabinet. They learned an important industry technique, and enjoyed taking ownership of a better working process for building!



## Gripper Robot

Robotics 1 classes created a gripper robot to program and see if it could detect which blocks to grab. The build took a lot of planning, building, and programming.



## Welding Students Take Their Final Exam

Welding students completed their final exam for the semester. They each had to demonstrate their welding abilities and complete a formal job interview.

# A Message From The CTE Supervisor

Cleveland High School CTE  
850 Raider Dr. Cleveland, TN 37312  
(423) 472-8098  
[rwhittenbarger@clevelandschools.org](mailto:rwhittenbarger@clevelandschools.org)

December 20, 2021

As we come to the end of our first semester, I'm so excited about how Cleveland City Schools Career and Technical Education (CTE) students have persevered through the many challenges that they have faced. Resilience, focus and goal oriented are some of the great attributes exemplified by our CTE students throughout this semester. With work ethics such as these, the outlook for our future workforce is encouraging. Students will adapt to the atmosphere around them, which in turn shows the level of commitment of our teachers. Cleveland City Schools CTE department is very blessed to have teachers who showcase the skill, talent and daily dedication to offer students to learn from the best. Our goal in Cleveland City Schools CTE department is to educate, inspire and equip ALL students and to award them an opportunity to experience success in life. At the end of the day, the key piece to the CTE educational puzzle is our business/industry partners. Our partners keep us focused on current technological trends, current operating procedures, and the latest labor market demands. This valuable information and input creates a seamless pathway for our students.

To that end, thank you to all our valuable business/industry partners.

Sincerely,

*Renny Whittenbarger*



## Connect with us!

Join us on social media and stay up to date on many of the great things happening here everyday.



## Important Dates

### **Dec 21**

Abbreviated Day

### **Dec 22 to Jan 4**

Christmas/New Years Break - Schools Closed

